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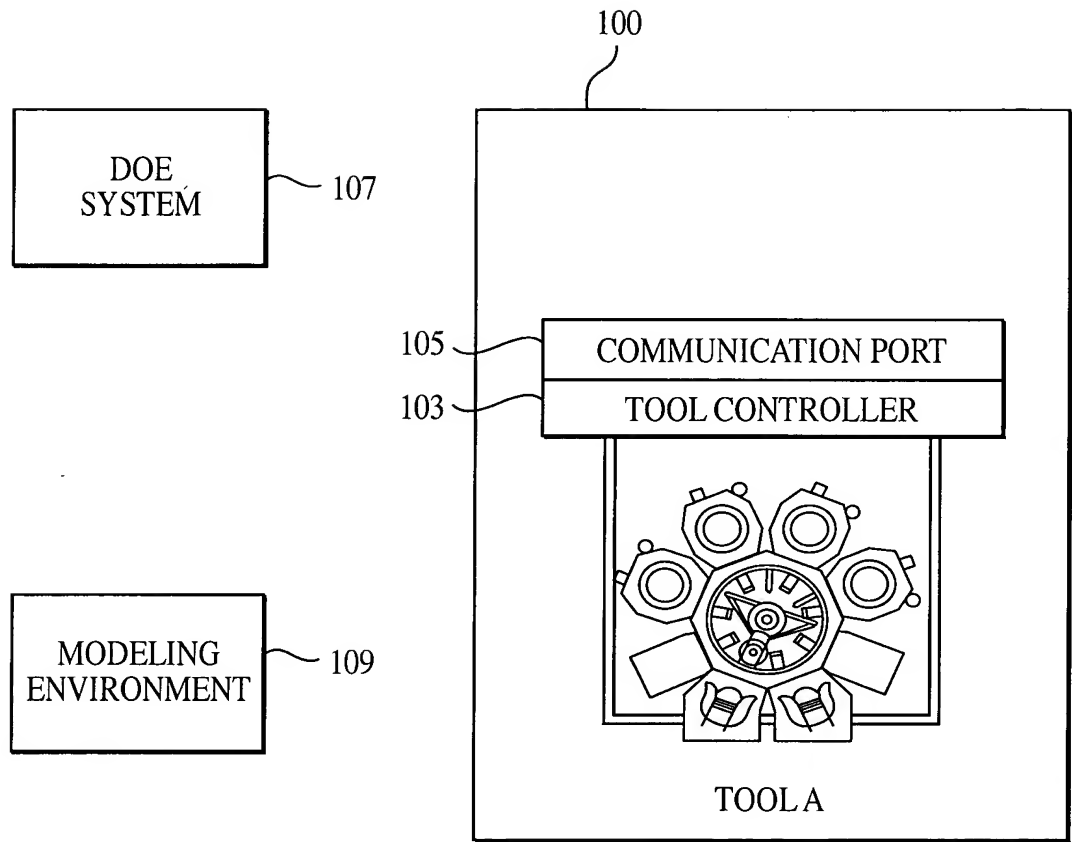


FIG. 1

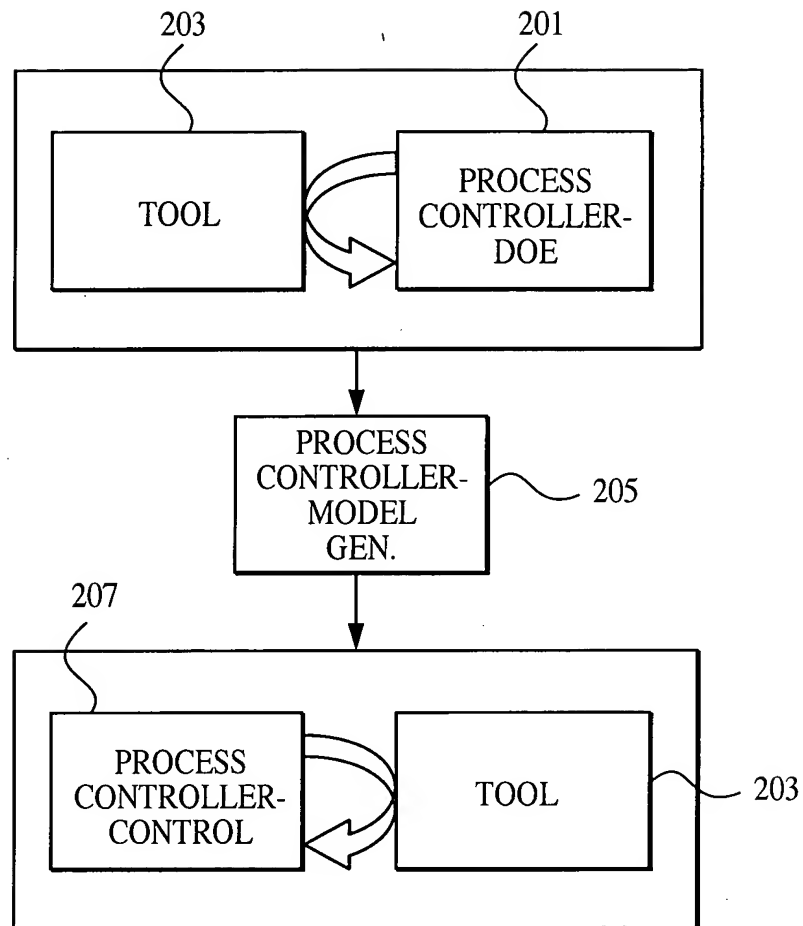


FIG. 2

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300

301 <NEW DOE PLAN>

303 CURRENT STATE: INACTIVE

305 DOE PLAN NAME: PETEOS

307 RESOURCE TYPE: OXIDE CMP PROFILER : PLATEN1

309

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341

ACTIVATE

SAVE

SAVE AS

HELP

FACTORS	RESPONSES	CASES	BLOCKS	EXPERIMENTS	UNITS	LSL	USL	TIME-BASED	CONSTANT VALUE
BASELINE TIME	MSEC	20000	60000	N					
CENTER TIME	MSEC	0	20000	N					
EDGE TIME	MSEC	5000	15000	N					

NEW...

OPEN...

DELETE

FIG. 3

☐ <NEW DOE PLAN>

CURRENT STATE:

DOE PLAN NAME:

RESOURCE TYPE:

FACTORS

RESPONSES

CASES

BLOCKS

EXPERIMENTS

RESPONSE NAME	UNITS	LSL	USL	TYPE	DEFAULT VALUE
THICKNESS	ANGSTROMM	2000	6000	RAW DATA PA	4000
PAD LIFE	HRS	0	40	MEASURED VARI	

FIG. 4

☐ <NEW DOE PLAN>

CURRENT STATE:

INACTIVE

CREATE R2R MODEL...

DOE PLAN NAME:

RESOURCE TYPE:

FACTORS

RESPO

CASE	BASE
1	6000
2	2000
3	6000
4	2000
5	4000
6	6000
7	2000
8	6000
9	4000
10	2000

501

☐ AUTO GENERATE

MODEL STRUCTURE

☒ LINEAR WITHOUT INTERACTIONS
 ☐ LINEAR WITH INTERACTIONS
 ☐ QUADRATIC WITHOUT INTERACTIONS
 ☐ QUADRATIC WITH INTERACTIONS

DOE METHOD

☒ CENTRAL COMPOSITE DESIGN
 ☐ FACTORIAL DESIGN

DOE FRACTION:

DOE FRACTION:

FULL

FULL

1/2

CASES:

503

507

509

511

513

515

517

519

TO GENERATE

IMPORT...

ADD ROW

INSERT ROW

DELETE ROW

OK

CANCEL

HELP

521

ACTIVATE

SAVE

SAVE AS

HELP

FIG. 5

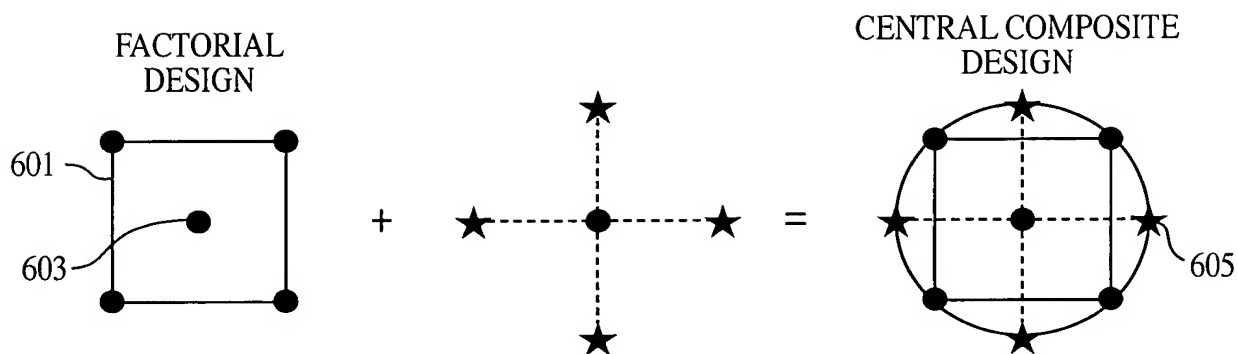


FIG. 6

SA BPSG

CREATE R2R MODEL...

CURRENT STATE:

INACTIVE

DOE PLAN NAME:

SA BPSG

RESOURCE TYPE:

CVD PRODUCER : PE-CVD

FACTORSRESPONSESCASESBLOCKSEXPERIMENTS

BLOCK NUMBER	BLOCK DESCRIPTION
1	LOW KIT
2	HIGH KIT

NEW...

OPEN...

DELETE

ACTIVATE

SAVE

SAVE AS

HELP

FIG. 7A

PE TEOS

CREATE R2R MODEL...

CURRENT STATE:

INACTIVE

DOE PLAN NAME:

PE TEOS

RESOURCE TYPE:

CVD PRODUCER : PE-CVD

FACTORS

RESPONSES

CASES

BLOCKS

EXPERIMENTS

EXPERIMENT	BLOCK	CASE	RFPOWER_1	RFPOWER_2	SPACING_1	SPACING_2	STEPTIME
1	1	1	700	700	250	250	55000
2	1	2	650	650	245	245	55000
3	1	3	700	700	245	245	55000
4	1	4	700	700	250	250	55000
5	1	5	650	650	250	250	55000
6	1	6	650	650	255	255	55000
7	1	7	750	750	245	245	55000
8	1	8	750	750	255	255	55000
9	1	9	750	750	250	250	55000
10	1	10	700	700	255	255	55000
11	1	1	700	700	250	250	55000

ADD ROW

INSERT ROW

DELETE ROW

ACTIVATE

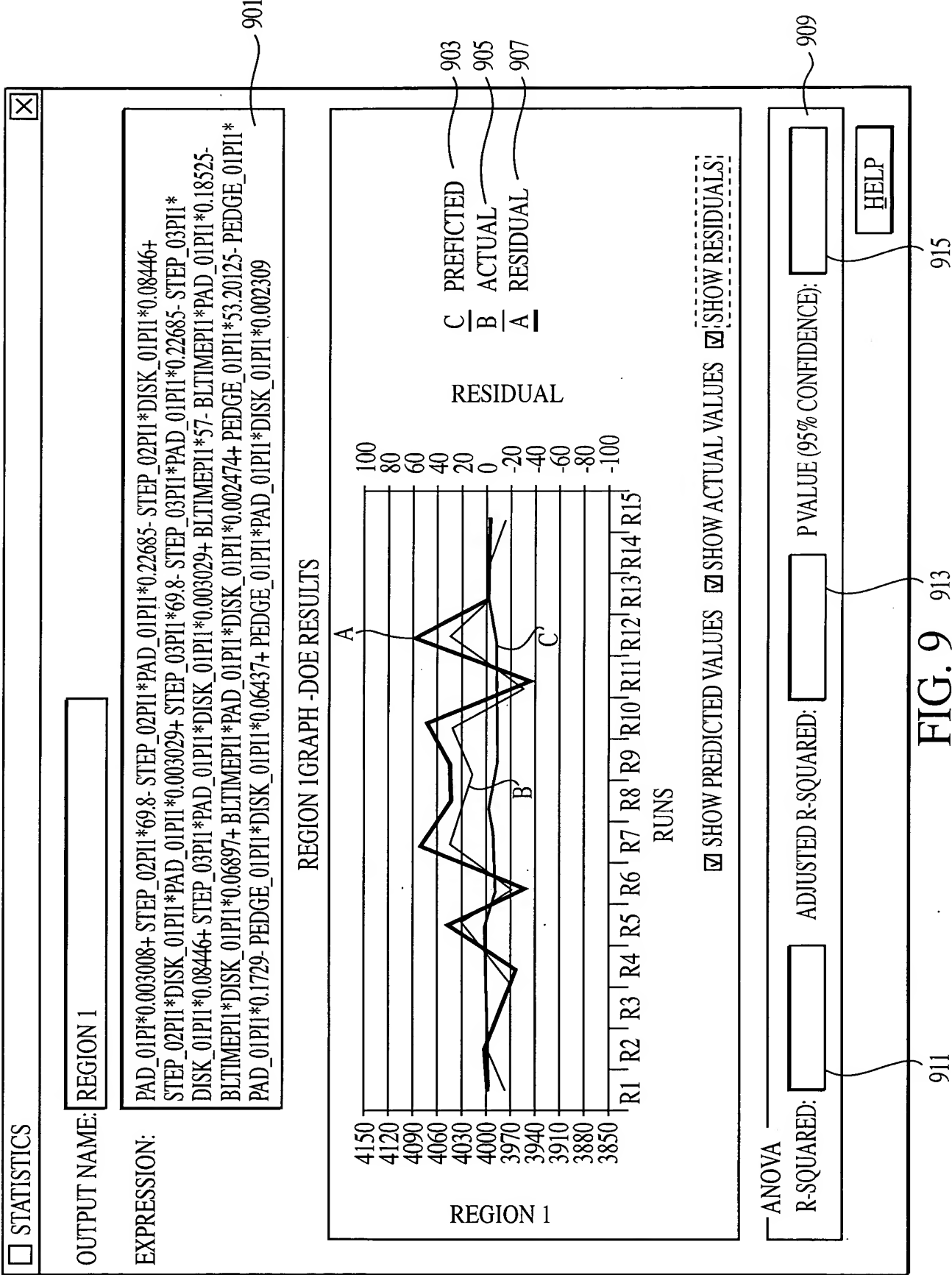
SAVE

SAVEAS

HELP

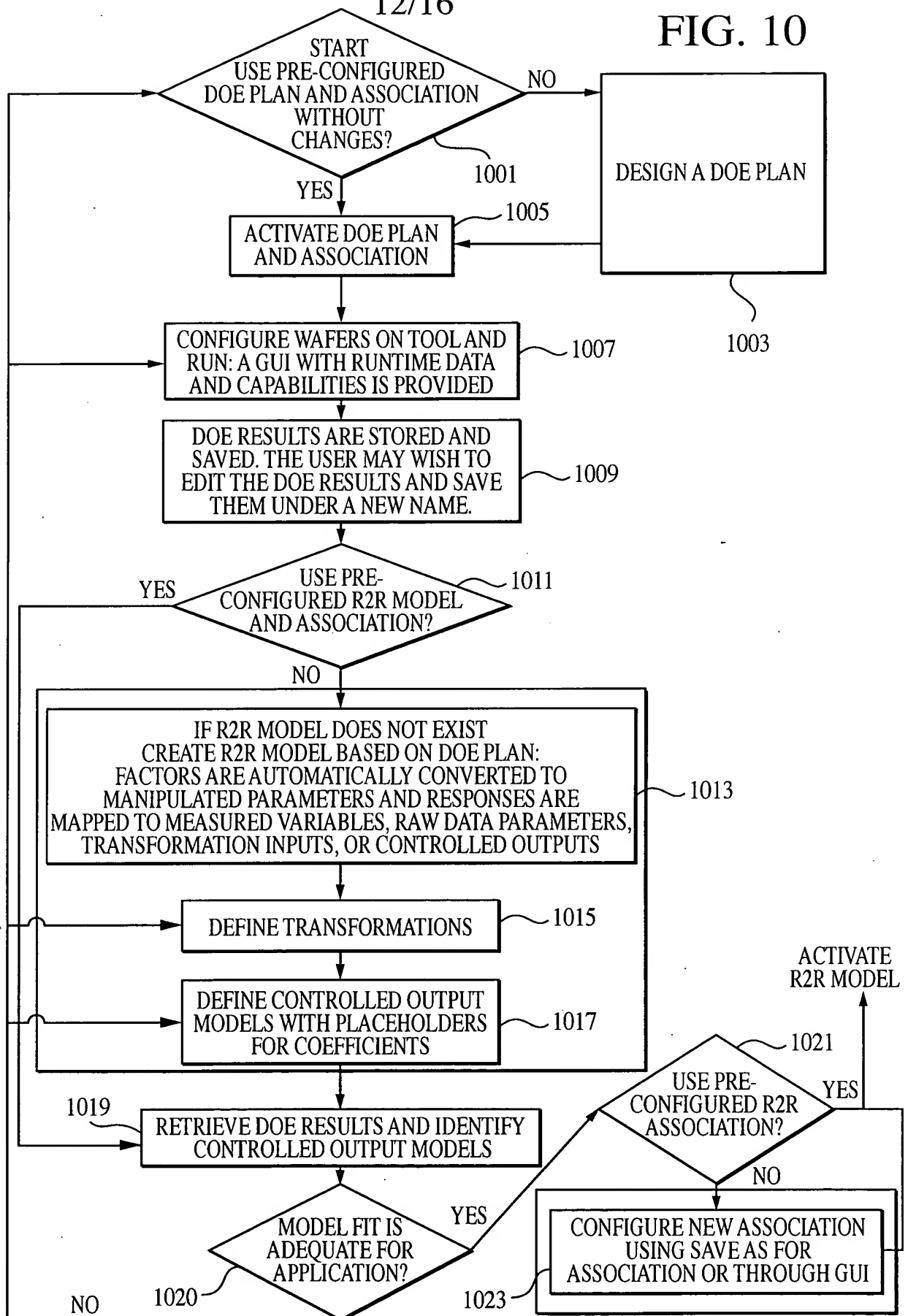
LOCK

FIG. 7B



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FIG. 10



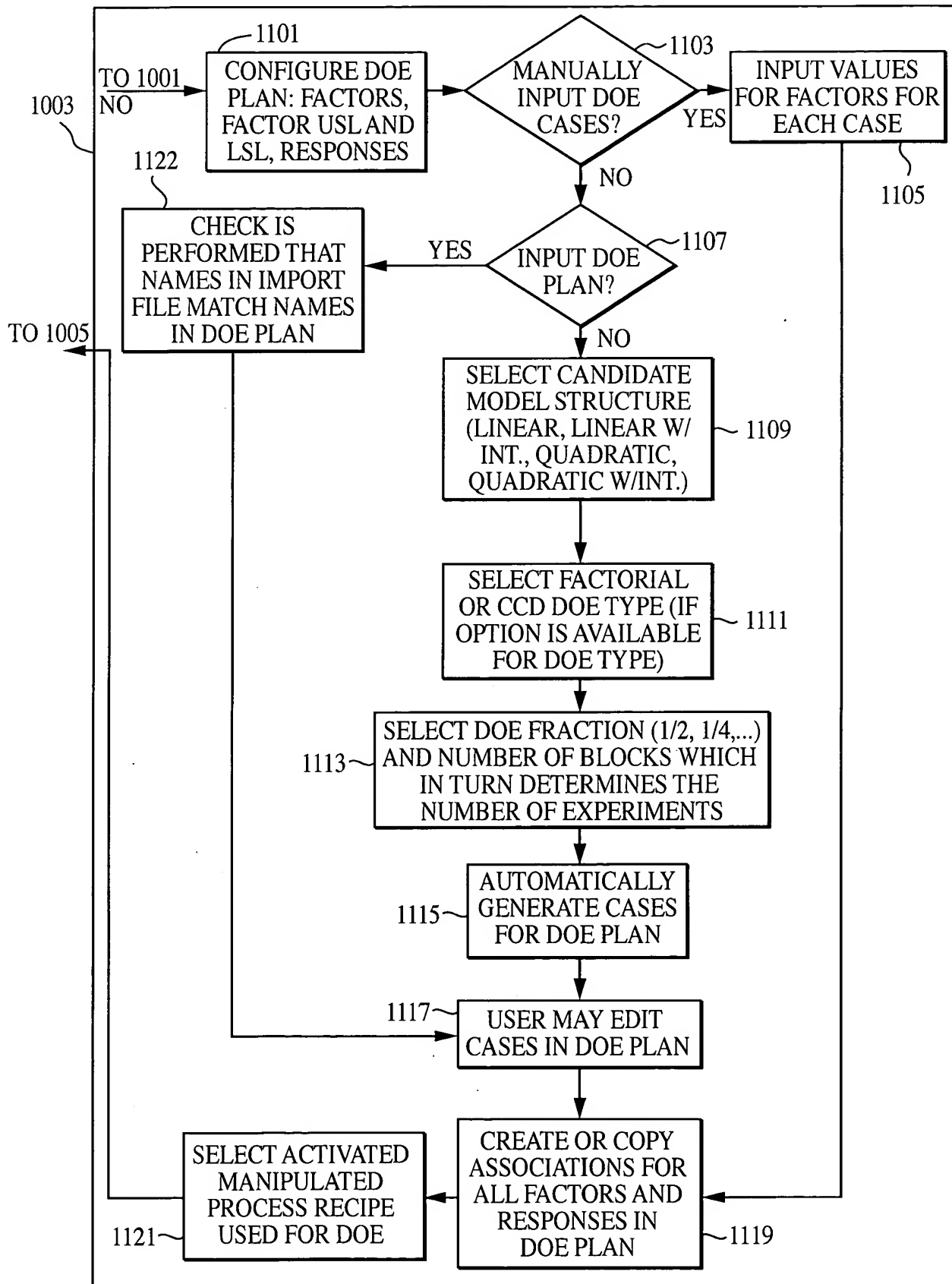


FIG. 11

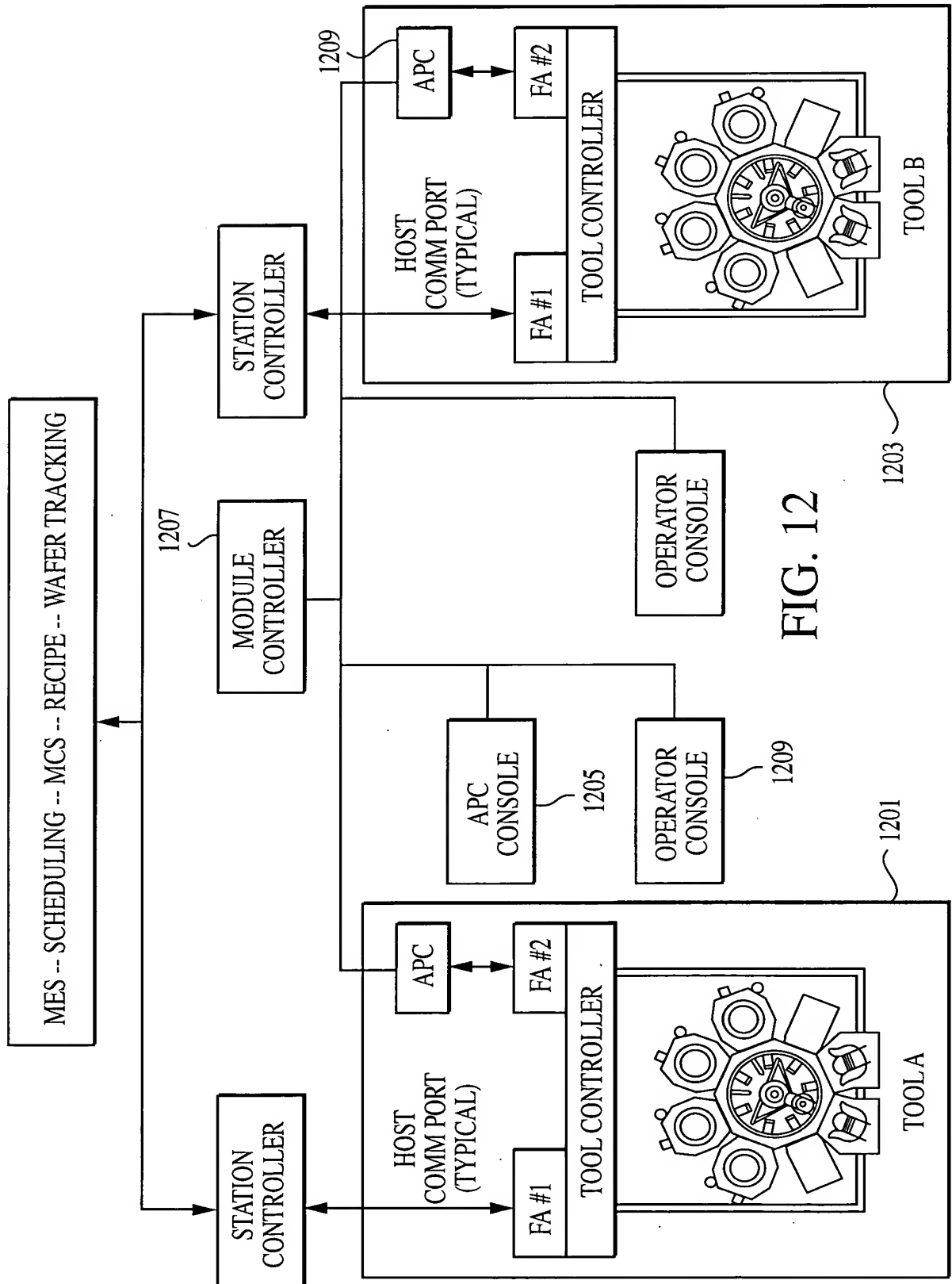


FIG. 12

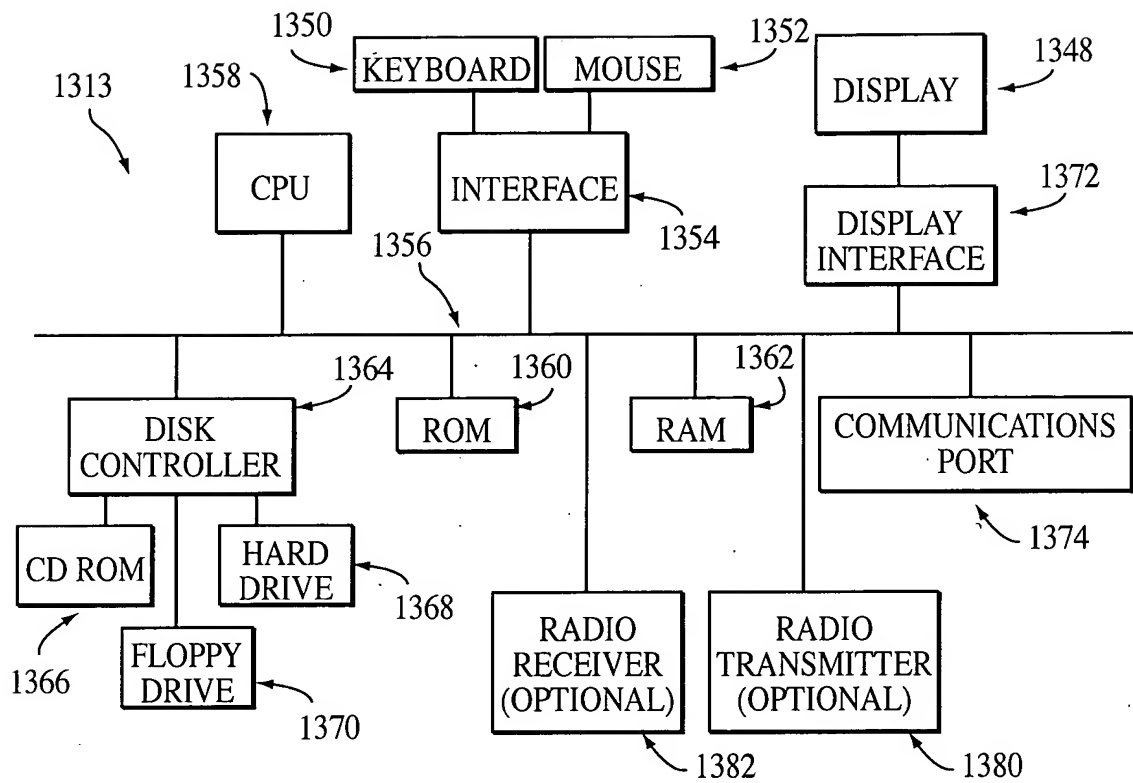


FIG. 13

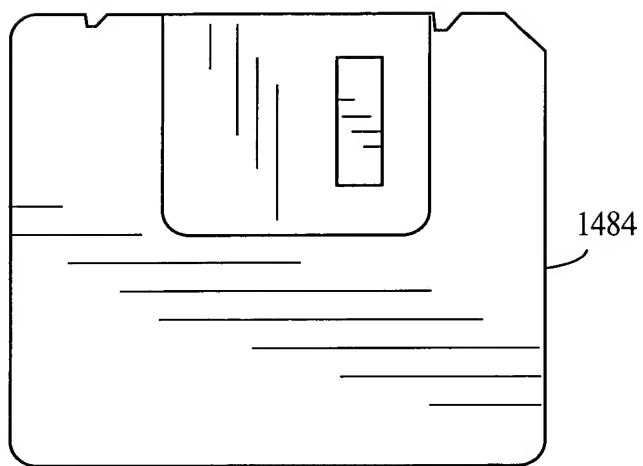


FIG. 14